WHAT IS CLAIMED IS:

1. A method for inducing active immunity in a bird against a selected immunogen, the method comprising:

   - injecting a biocompatible implant releasably containing the selected immunogen *in ovo*.

2. The method according to claim 1, wherein the implant is injected during the fourth quarter of incubation of an egg.

3. The method according to claim 1, wherein the implant is injected at about 15–28 days of incubation of an egg.

4. The method according to claim 1, wherein the bird is selected from the group consisting of: turkey, chicken, duck, geese, ostrich and pheasant.

5. The method according to claim 4, wherein the bird is a turkey and the implant is injected at about day 25–27 of incubation of an egg.

6. The method according to claim 4, wherein the bird is a chicken and the implant is injected at about day 17–19 of incubation of an egg.

7. The method according to claim 1, wherein the biocompatible implant is formulated to provide sustained release of the immunogen.

8. The method according to claim 1, wherein the biocompatible implant is formulated to provide delayed release of the immunogen.

9. The method according to claim 1, wherein the biocompatible implant is formulated to provide sustained and delayed release of the immunogen.

10. The method according to claim 1, wherein the bird is a turkey and the biocompatible implant is formulated to provide delayed release of the immunogen until about 1–28 days after hatching.

11. The method according to claim 1, wherein the bird is a chicken and the biocompatible implant is formulated to provide delayed release of the immunogen until about 1–28 days after hatching.

12. The method according to claim 1, wherein the bicompatible implant is formulated to provide sustained release of the immunogen for at least 12 weeks after hatching.

13. The method according to claim 1, further comprising administering a booster immunization to the bird at about 3–12 weeks after hatching to stimulate a secondary immune response in the bird.

14. The method according to claim 13, wherein the booster is in the form of an implant or an injectable liquid.

15. The method according to claim 13, wherein the booster is in the form of a modified live vaccine.

16. The method according to claim 1, wherein the bird is administered an implant containing about 25–5000 μg of the immunogen.

17. The method according to claim 1, wherein the implant provides a sustained release rate of the immunogen of about 1–250 μg per day.

18. The method according to claim 17, wherein the implant is composed of a biodegradable polymer material.

19. The method according to claim 18, wherein the polymer material is selected from the group consisting of a cellulosic polymer, polylactide, polyglycolide, polycaprolactone, and copolymers thereof.

20. The method according to claim 16, wherein the implant is a cholesterol–based implant.

21. The method according to claim 1, wherein the bird is administered the implant comprises a non–erodible synthetic polymer selected from the group consisting of polyethylene, and ethylene–acetate copolymer.

22. The method according to claim 1, wherein the immunogen is derived from an organism selected from the group consisting of viruses, bacteria, fungi, molds, protozoans, nematodes, helminthes, and spirochetes.

23. The method according to claim 22, wherein the immunogen is selected from the group consisting of a peptide, polypeptide, protein, glycoprotein, polysaccharide, nucleic acid, lipopolysaccharide, sphingolipid, toxin, cytotoxin, anti–idiotype, allergen, or hormone.

24. The method according to claim 22, wherein the immunogen is derived from a virus selected from the group consisting of New Castle disease virus, hemorrhagic enteriditis virus, infectious rhinotracheitis virus, infectious bursal disease virus, infectious bronchitis virus, avian encephalomyelitis virus, bovine viral diarrhea virus, bovine respiratory syncytial virus, hog cholera virus, equine encephalomyelitis virus, canine distemper virus, fowl pox virus, rabies virus, avian leukosis virus, and avian influenza virus.

25. The method according to claim 22, wherein the immunogen is derived from a bacterium selected from the group consisting of *Escherichia coli*, *Salmonella*, *Pasteurella*, *Pseudomonas*, *Klebsiella*, *Actinobacillus*, *Haemophilus*,

Streptococcus, *Bordetella*, *Staphylococcus*, *Clostridia*, *Erysipelothrix*, *ornithobacterium*, and *Borrelia*.

26. The method according to claim 22, wherein the immunogen is derived from a fungi or mold selected from the group consisting of *Aspergillus*, *Penicillium*, *Fusarium*, *Rhizopus* and *Candida*.

27. The method according to claim 22, wherein the immunogen is a polypeptide capable of functioning in the transport of iron across a cell membrane of an organism.

28. The method according to claim 27, wherein the polypeptide is a siderophore receptor protein reactive with a siderophore selected from the group consisting of aerobactin, enterochelin, citrate, multocidin, ferrichrome, coprogen, mycobactins, and combinations thereof.

29. The method according to claim 28, wherein the immunogen further comprises a porin.

30. A method for administering a selected agent to a bird, the method comprising:

- administering to the bird *in ovo*, a biocompatible implant releasably containing the selected agent.

31. The method according to claim 30 wherein the selected agent is an antibody.

32. The method according to claim 30 wherein the selected agent is an antibiotic.

33. The method according to claim 30 wherein the selected agent is an immunogen.

34. A method for inducing immunity in a bird against selected immunogen comprising:

injecting a biocompatible implant *in ovo*, wherein the biocompatible implant comprises the selected immunogen and a biocompatible matrix material, wherein the implant provides for sustained release of the immunogen until a time when maternal antibodies of the bird to the immunogen are sufficiently reduced so that the bird is capable of mounting an immune response to the immunogen, wherein the immunogen comprises a siderophore receptor protein from a gram-negative bacterium.

35. The method according to claim 34, wherein the implant is injected during the fourth quarter of incubation of an egg.

36. The method according to claim 34, wherein the implant is injected at about 15-28 days of incubation of an egg.

37. The method according to claim 34, wherein the bird is selected from the group consisting of turkey, chicken, duck, goose, ostrich and pheasant.

38. The method according to claim 34, wherein the bird is a turkey and the implant is injected at about 25-27 days of incubation of an egg.

39. The method according to claim 34, wherein the implant provides for sustained release of the immunogen for about 1-90 days post-hatching.

40. The method according to claim 34, wherein the implant provides for sustained release of the immunogen for about 1-60 days post-hatching.

41. The method according to claim 34, wherein the implant provides for sustained release of the immunogen for about 1-35 days post-hatching.

42. The method according to claim 34, wherein the implant is injected at about 25-27 days of incubation of an egg and wherein the implant provides for sustained release of the immunogen for about 1-90 days post-hatching of the egg.

43. The method according to claim 34, further comprising administering a second dose of the immunogen at 3-12 weeks post hatching to stimulate a secondary immune response.

44. The method according to claim 34, wherein the bird is a chicken and the implant is injected at about day 17 to 19 of incubation of an egg.

45. A method for inducing immunity in a bird against selected immunogen comprising:

injecting a biocompatible implant *in ovo*, wherein the biocompatible implant comprises the selected immunogen and a biocompatible matrix material, wherein the implant provides for sustained release of the immunogen until a time when maternal antibodies of the bird to the immunogen are sufficiently reduced so that the bird is capable of mounting an immune response to the immunogen, wherein the implant further comprises an adjuvant.

46. The method according to claim 45, wherein the implant is injected during the fourth quarter of incubation of an egg.

47. The method according to claim 45, wherein the implant is injected at about 15-28 days of incubation of an egg.

48. The method according to claim 45, wherein the bird is selected from the group consisting of turkey, chicken, duck, goose, ostrich and pheasant.

49. The method according to claim 45, wherein the bird is a turkey and the implant is injected at about 25-27 days of incubation of an egg.

50. The method according to claim 45, wherein the implant provides for sustained release of the immunogen for about 1-90 days post-hatching.

51. The method according to claim 45, wherein the implant provides for sustained release of the immunogen for about 1-60 days post-hatching.

52. The method according to claim 45, wherein the implant provides for sustained release of the immunogen for about 1-35 days post-hatching.

53. The method according to claim 45, wherein the implant is injected at about 25-27 days of incubation of an egg and wherein the implant provides for sustained release of the immunogen for about 1-90 days post-hatching of the egg.

54. The method according to claim 45, further comprising administering a second dose of the immunogen at 3-12 weeks post hatching to stimulate a secondary immune response.

55. The method according to claim 45, wherein the bird is a chicken and the implant is injected at about day 17 to 19 of incubation of an egg.

56. A method for inducing immunity in a bird against a selected immunogen comprising:

injecting a biocompatible implant *in ovo*, wherein the biocompatible implant comprises the selected immunogen and a biocompatible matrix material, wherein the implant provides for sustained and delayed release of the immunogen until a time when maternal antibodies of the bird to the immunogen are sufficiently reduced so that the bird is capable of mounting an immune response to the immunogen, wherein the immunogen comprises a siderophore receptor protein from a gram-negative bacterium.

57. The method according to claim 56, wherein the implant is injected during the fourth quarter of incubation of an egg.

58. The method according to claim 56, wherein the implant is injected at about 15-28 days of incubation of an egg.

59. The method according to claim 56, wherein the bird is selected from the group consisting of turkey, chicken, duck, goose, ostrich and pheasant.

60. The method according to claim 56, wherein the bird is a turkey and the implant is injected at about 25-27 days of incubation of an egg.

61. The method according to claim 56, wherein the implant provides for sustained release of the immunogen for about 1-90 days post-hatching.

62. The method according to claim 56, wherein the implant provides for sustained release of the immunogen for about 1-60 days post-hatching.

63. The method according to claim 56, wherein the implant provides for sustained release of the immunogen for about 1-35 days post-hatching.

64. The method according to claim 56, wherein the implant is injected at about 25-27 days of incubation of an egg and wherein the implant provides for sustained release of the immunogen for about 1-90 days post-hatching of the egg.

65. The method according to claim 56, wherein the bird is a chicken and the implant is injected at about day 17 to 19 of incubation of an egg.

66. The method according to claim 56, further comprising administering a second dose of the immunogen at 3-12 weeks post hatching to stimulate a secondary immune response.